

Amendments to the Claims

The listing of claims replaces all prior versions and listing of claims in the application:

Listing of Claims:

1. (Previously Presented) A device for tissue repair or replacement, comprising first and second components having different relative rates of *in vivo* degradation, the first component comprising a unitary and continuous ceramic structure having interconnected porosity throughout and the second component comprising a polymer infiltrated in the ceramic structure, and the first component having a higher rate of *in vivo* degradation than the second component, the first and second components being arranged relative to each other so that, after implantation of the device, the first component degrades *in vivo* leaving a scaffold formed of the second component, the scaffold having pores into which tissue can infiltrate, wherein the device, when initially implanted, does not have sufficient porosity to support tissue ingrowth.

2-7. (Canceled)

8. (Original) The device of claim 1 wherein the device is substantially non-porous prior to implantation into a patient.

9. (Original) The device of claim 1 wherein there is at least an 8 week difference between the degradation rates of the components.

10. (Original) The device of claim 9 wherein the degradation rates differ by about 12 months to 2 years.

11. (Original) The device of claim 1 wherein at least one of the components includes a therapeutic additive.

12-50. (Canceled)

51. (Previously presented) The device of claim 1 wherein the device, when initially implanted, is in the form of a solid preformed structure.

52. (Previously Presented) The device of claim 1 wherein the polymer fills interconnecting pores of the ceramic structure.

53. (Previously presented) The device of claim 51 wherein the polymer is resorbable.

54. (Previously Presented) A device for tissue repair or replacement, comprising first and second components having different relative rates of *in vivo* degradation, the first component comprising a unitary and continuous ceramic structure having interconnected porosity throughout and the second component comprising a polymer infiltrated in the ceramic structure, and wherein the first component has a higher rate of *in vivo* degradation than the second component, the first and second components being arranged relative to each other so that, after implantation of the device, the first component degrades *in vivo* leaving a scaffold formed of the second component, the scaffold having pores into which tissue can infiltrate, wherein the device, when initially implanted, is substantially non-porous.

55. (Previously Presented) The device of claim 54 wherein the polymer fills interconnecting pores of the ceramic structure.

56. (New) A device for tissue repair or replacement, comprising first and second components having different relative rates of *in vivo* degradation, the first component comprising a unitary and continuous ceramic structure having interconnected porosity throughout and the second component comprises a polymer infiltrated in the ceramic structure such that the polymer fills the interconnected pores throughout the entire ceramic structure, and wherein the first component has a higher rate of *in vivo* degradation than the second component, the first and second components being arranged

relative to each other so that, after implantation of the device, the first component degrades *in vivo* leaving a scaffold formed of the second component, the scaffold having pores into which tissue can infiltrate, wherein the device, when initially implanted, does not have sufficient porosity to support tissue ingrowth.

57. (New) A device for tissue repair or replacement, comprising first and second components having different relative rates of *in vivo* degradation, the first component comprising a unitary and continuous ceramic structure having interconnected porosity throughout and the second component comprising a polymer infiltrated in the ceramic structure, and wherein the first component has a higher rate of *in vivo* degradation than the second component, the first and second components being arranged relative to each other so that, after implantation of the device, the first component degrades *in vivo* leaving a scaffold formed of the second component, the scaffold having pores into which tissue can infiltrate, wherein the device, when initially implanted, is non-porous.